Electronic Supplementary Information

Improvement of stability of ZnO/CH₃NH₃PbI₃ bilayer by aging step for preparing high-performance perovskite solar cells under ambient conditions

Y. Guo,^a X. Li, *^{b, a} L. L. Kang,^a X. He,^a Z. Q. Ren,^a J. D. Wu^a and J. Y. Qi*^c

^a School of Chemistry and Chemical Engineering, Harbin Institute of Technology, Harbin 150090, China.

^b State Key Lab of Urban Water Resource and Environment, Harbin Institute of

Technology, Harbin 150090, China.

 ^c School of Municipal and Environmental Engineering, Harbin Institute of Technology, Harbin 150090, China.

*Corresponding author

E-mail Address: lixin@hit.edu.cn (X. Li); jyq@hit.edu.cn (J.Y. Qi)



P/19/2015HVmagWDmode----1 µm2:40:23 PM2:000 kV50 000 x7.9 mmSEHelios Nanolab 6001Fig. S1. SEM image of ZnO film annealed at 70 °C for 30 min.



Fig. S2. XRD patterns of aged ZnO/CH₃NH₃PbI₃ bilayer. The red line is collected from fresh sample and the black line refers to the one stored for 35 days under ambient conditions (25 °C and 30% humidity).